

Safety Data Sheet according to (EC) No 1907/2006

Page 1 of 12

SDS No. : 378483
V002.3

BONDERITE C-MC X

Revision: 28.05.2015
printing date: 23.09.2016

Replaces version from: 26.03.2014

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

BONDERITE C-MC X

Contains:

Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts
Sodium silicate

1.2. Relevant identified uses of the substance or mixture and uses advised against

Intended use:
Cleaners for Industrial Application

1.3. Details of the supplier of the safety data sheet

Henkel AG & Co. KGaA
Henkelstr. 67
40589 Düsseldorf

Germany

Phone: +49 211 797 0
Fax-no.: +49 211 798 2009

ua-productsafety.de@henkel.com

1.4. Emergency telephone number

The Henkel information service also provides an around-the-clock telephone service on phone no.+49-(0)211-797-3350 for exceptional cases.

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification (CLP):

Skin irritation	Category 2
H315 Causes skin irritation.	
Serious eye damage	Category 1
H318 Causes serious eye damage.	

2.2. Label elements

Label elements (CLP):

Hazard pictogram:



Signal word: Danger

Hazard statement: H315 Causes skin irritation.
H318 Causes serious eye damage.

Precautionary statement: P280 Wear protective gloves/eye protection.
Prevention

Precautionary statement: P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
Response P310 Immediately call a POISON CENTER or doctor.

2.3. Other hazards

None if used properly.

SECTION 3: Composition/information on ingredients

3.2. Mixtures

Declaration of the ingredients according to CLP (EC) No 1272/2008:

Hazardous components CAS-No.	EC Number REACH-Reg No.	content	Classification
Sodium carbonate 497-19-8	207-838-8 01-2119485498-19	25- 50 %	Eye Irrit. 2 H319
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	270-115-0 01-2119489428-22	5- 10 %	Acute Tox. 4; Oral H302 Skin Irrit. 2 H315 Eye Dam. 1 H318 Aquatic Chronic 3 H412
Sodium silicate 1344-09-8	215-687-4 01-2119448725-31	5- 10 %	Skin Irrit. 2 H315 Eye Dam. 1 H318 STOT SE 3; Inhalation H335
Alcohols, C12-18, ethoxylated 68213-23-0	500-201-8	1- 5 %	Acute Tox. 4 H302 Eye Dam. 1 H318 Aquatic Chronic 3 H412

For full text of the H - statements and other abbreviations see section 16 "Other information".
Substances without classification may have community workplace exposure limits available.

Declaration of ingredients according to Detergent Regulation 648/2004/EC

5 - 15 % anionic surfactants
< 5 % non-ionic surfactants
phosphonates
polycarboxylates
contains Perfumes
Allergenic fragrance ingredients >=100 ppm: Hexyl Cinnamal, Limonene, Butylphenyl Methylpropional

SECTION 4: First aid measures

4.1. Description of first aid measures

Inhalation:

Remove person from dust-contaminated zone, seek medical advice if necessary.

Skin contact:

IF ON SKIN: Wash with plenty of soap and water.
In case of adverse health effects seek medical advice.

Eye contact:

Immediately flush eyes with soft jet of water or eye rinse solution for at least 5 minutes. If pains remains (intensive smarting, sensivity to light, visual disturbance) continue flushing and contact/seek doctor or hospital.

Ingestion:

Rinse mouth, drink 1-2 glasses of water, do not induce vomiting, consult a doctor.

4.2. Most important symptoms and effects, both acute and delayed

EYE: Irritation, conjunctivitis.

SKIN: Redness, inflammation.

4.3. Indication of any immediate medical attention and special treatment needed

See section: Description of first aid measures

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media:

Carbon dioxide, foam, powder
Water spray jet

Extinguishing media which must not be used for safety reasons:

High pressure waterjet

5.2. Special hazards arising from the substance or mixture

Formation of toxic gases is possible during heating or in fires.

5.3. Advice for firefighters

Wear self-contained breathing apparatus.

Additional information:

The product itself does not burn. Any fire extinguishing action should be appropriate to the surroundings.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Avoid contact with skin and eyes.
Avoid dust formation.

6.2. Environmental precautions

Do not empty into drains / surface water / ground water.

6.3. Methods and material for containment and cleaning up

Remove mechanically.
Dispose of contaminated material as waste according to Section 13.

6.4. Reference to other sections

See advice in section 8

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Avoid skin and eye contact.
 Avoid dust formation.
 Ensure that workrooms are adequately ventilated.
 See advice in section 8

Hygiene measures:

Wash hands before work breaks and after finishing work.
 Do not eat, drink or smoke while working.
 Take off contaminated clothing and wash before reuse.
 The workplace should be equipped with an emergency shower and eye-rinsing facility.

7.3. Specific end use(s)

Cleaners for Industrial Application

SECTION 8: Exposure controls/personal protection**8.1. Control parameters****Occupational Exposure Limits**

Valid for
 Germany

Ingredient [Regulated substance]	ppm	mg/m ³	Value type	Short term exposure limit category / Remarks	Regulatory list
DUSTS, NON-SPECIFIC, RESPIRABLE FRACTION			Short Term Exposure Classification:	Category II: substances with a resorptive effect.	TRGS 900
DUSTS, NON-SPECIFIC, RESPIRABLE FRACTION		10	Exposure limit(s):	2	TRGS 900
DUSTS, NON-SPECIFIC, RESPIRABLE FRACTION		1,25	Exposure limit(s):		TRGS 900

Predicted No-Effect Concentration (PNEC):

Name on list	Environmental Compartment	Exposure period	Value				Remarks
			mg/l	ppm	mg/kg	others	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	aqua (freshwater)					0,268 mg/L	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	aqua (marine water)					0,0268 mg/L	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	aqua (intermittent releases)					0,0167 mg/L	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	STP					3,43 mg/L	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	sediment (freshwater)				8,1 mg/kg		
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	sediment (marine water)				8,1 mg/kg		
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	soil				35 mg/kg		

Derived No-Effect Level (DNEL):

Name on list	Application Area	Route of Exposure	Health Effect	Exposure Time	Value	Remarks
Sodium carbonate 497-19-8	Workers	Inhalation	Long term exposure - local effects		10 mg/m ³	
Sodium carbonate 497-19-8	general population	Inhalation	Acute/short term exposure - local effects		10 mg/m ³	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	Workers	Dermal	Long term exposure - systemic effects		170 mg/kg	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	Workers	Inhalation	Long term exposure - systemic effects		12 mg/m ³	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	Workers	Inhalation	Long term exposure - local effects		12 mg/m ³	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	general population	Dermal	Long term exposure - systemic effects		85 mg/kg	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	general population	Inhalation	Long term exposure - systemic effects		3 mg/m ³	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	general population	oral	Long term exposure - systemic effects		0,85 mg/kg	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	general population	Inhalation	Long term exposure - local effects		3 mg/m ³	

Biological Exposure Indices:

None

8.2. Exposure controls:

Engineering controls:
Thorough dedusting.

Respiratory protection:

In case of dust formation, we recommend wearing of appropriate respiratory protection equipment with particle filter P. This recommendation should be matched to local conditions.

Hand protection:

Chemical-resistant protective gloves (EN 374). Suitable materials for short-term contact or splashes (recommended: at least protection index 2, corresponding to > 30 minutes permeation time as per EN 374): Polychloroprene (CR; >= 1 mm thickness) or natural rubber (NR; >=1 mm thickness) Suitable materials for longer, direct contact (recommended: protection index 6, corresponding to > 480 minutes permeation time as per EN 374): Polychloroprene (CR; >= 1 mm thickness) or natural rubber (NR; >=1 mm thickness) This information is based on literature references and on information provided by glove manufacturers, or is derived by analogy with similar substances. Please note that in practice the working life of chemical-resistant protective gloves may be considerably shorter than the permeation time determined in accordance with EN 374 as a result of the many influencing factors (e.g. temperature). If signs of wear and tear are noticed then the gloves should be replaced.

Eye protection:

Goggles which can be tightly sealed.

Skin protection:

Suitable protective clothing

SECTION 9: Physical and chemical properties**9.1. Information on basic physical and chemical properties**

Appearance	powder
	powder
	white
Odor	perfumed

Odour threshold	No data available / Not applicable
pH (20 °C (68 °F); Conc.: 10 g/l; Solvent: Demineralised water)	9,5 - 10,5
Initial boiling point	No data available / Not applicable
Flash point	Not applicable
Decomposition temperature	No data available / Not applicable
Vapour pressure	No data available / Not applicable
Density	No data available / Not applicable
Bulk density	480,0 - 560,0 g/ml
Viscosity	No data available / Not applicable
Viscosity (kinematic)	No data available / Not applicable
Explosive properties	No data available / Not applicable
Solubility (qualitative) (20 °C (68 °F); Solvent: Water)	Soluble
Solidification temperature	No data available / Not applicable
Melting point	No data available / Not applicable
Flammability	No data available / Not applicable
Auto-ignition temperature	No data available / Not applicable
Explosive limits	No data available / Not applicable
Partition coefficient: n-octanol/water	No data available / Not applicable
Evaporation rate	No data available / Not applicable
Vapor density	No data available / Not applicable
Oxidising properties	No data available / Not applicable

9.2. Other information

No data available / Not applicable

SECTION 10: Stability and reactivity

10.1. Reactivity

Reaction with acids: production of heat and carbon dioxide.

10.2. Chemical stability

Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions

See section reactivity

10.4. Conditions to avoid

No decomposition if used according to specifications.

10.5. Incompatible materials

See section reactivity

10.6. Hazardous decomposition products

None if used for intended purpose.

In case of fire toxic gases can be released.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

General toxicological information:

The mixture is classified based on the available hazard information for the ingredients as defined in the classification criteria for mixtures for each hazard class or differentiation in Annex I to Regulation 1272/2008/EC. Relevant available health/ecological information for the substances listed under Section 3 is provided in the following.

Skin irritation:

Causes skin irritation.

Eye irritation:

Causes serious eye damage.

Acute oral toxicity:

Hazardous components CAS-No.	Value type	Value	Route of application	Exposure time	Species	Method
Sodium carbonate 497-19-8	LD50	2.800 mg/kg	oral		rat	OECD Guideline 401 (Acute Oral Toxicity)
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	LD50	1.080 mg/kg	oral		rat	
Alcohols, C12-18, ethoxylated 68213-23-0	LD50	1.700 mg/kg	oral		rat	

Acute inhalative toxicity:

Hazardous components CAS-No.	Value type	Value	Route of application	Exposure time	Species	Method
Sodium carbonate 497-19-8	Acute toxicity estimate (ATE)	5,1 mg/l	Aerosol			Expert judgement
Sodium carbonate 497-19-8	LC50		Aerosol	2 h	rat	

Acute dermal toxicity:

Hazardous components CAS-No.	Value type	Value	Route of application	Exposure time	Species	Method
Sodium carbonate 497-19-8	LD50	> 2.000 mg/kg	dermal		rabbit	OECD Guideline 402 (Acute Dermal Toxicity)
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	LD50	> 2.000 mg/kg	dermal		rat	

Skin corrosion/irritation:

Hazardous components CAS-No.	Result	Exposure time	Species	Method
Sodium carbonate 497-19-8	not irritating	4 h	rabbit	OECD Guideline 404 (Acute Dermal Irritation / Corrosion)
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	Category 2 (irritant)	4 h	rabbit	OECD Guideline 404 (Acute Dermal Irritation / Corrosion)
Alcohols, C12-18, ethoxylated 68213-23-0	moderately irritating	4 h	rabbit	OECD Guideline 404 (Acute Dermal Irritation / Corrosion)

Serious eye damage/irritation:

Hazardous components CAS-No.	Result	Exposure time	Species	Method
Sodium carbonate 497-19-8	irritating		rabbit	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	highly irritating	30 s	rabbit	OECD Guideline 405 (Acute Eye Irritation / Corrosion)
Alcohols, C12-18, ethoxylated 68213-23-0	highly irritating	24 h	rabbit	OECD Guideline 405 (Acute Eye Irritation / Corrosion)

Respiratory or skin sensitization:

Hazardous components CAS-No.	Result	Test type	Species	Method
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	not sensitising		guinea pig	OECD Guideline 406 (Skin Sensitisation)
Sodium silicate 1344-09-8	not sensitising	Mouse local lymphnode assay (LLNA)	mouse	OECD Guideline 429 (Skin Sensitisation: Local Lymph Node Assay)

Germ cell mutagenicity:

Hazardous components CAS-No.	Result	Type of study / Route of administration	Metabolic activation / Exposure time	Species	Method
Sodium carbonate 497-19-8	negative	bacterial reverse mutation assay (e.g Ames test)	with		Ames Test
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	negative	mammalian cell gene mutation assay	with and without		OECD Guideline 476 (In vitro Mammalian Cell Gene Mutation Test)
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	negative	oral: gavage		mouse	OECD Guideline 474 (Mammalian Erythrocyte Micronucleus Test)

Reproductive toxicity:

Hazardous substances CAS-No.	Result / Classification	Species	Exposure time	Species	Method
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	NOAEL P = 350 mg/kg NOAEL F1 = 350 mg/kg NOAEL F2 = 350 mg/kg	three- generation study oral: feed		rat	

Repeated dose toxicity

Hazardous components CAS-No.	Result	Route of application	Exposure time / Frequency of treatment	Species	Method
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	NOAEL=125 mg/kg	oral: gavage	one monthdaily	rat	
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	LOAEL=250 mg/kg	oral: gavage	one monthdaily	rat	

SECTION 12: Ecological information**General ecological information:**

The mixture is classified based on the available hazard information for the ingredients as defined in the classification criteria for mixtures for each hazard class or differentiation in Annex I to Regulation 1272/2008/EC. Relevant available health/ecological information for the substances listed under Section 3 is provided in the following.
Do not empty into drains / surface water / ground water.

Ecotoxicity

Acute fish toxicity: LC50 > 1 - <= 10 mg product/l.
Acute bacterial toxicity: EC50 > 10 - <= 100 mg product/l.

Other adverse effects:

If acidic or alkaline products are discharged into wastewater installations care must be taken that the discharged wastewater has a pH in the range pH 6 - 10, as pH variations could cause disorders in wastewater channels and biological sewage treatment plants. The local discharge regulations take precedence.

12.1. Toxicity

Hazardous components CAS-No.	Value type	Value	Acute Toxicity Study	Exposure time	Species	Method
Sodium carbonate 497-19-8	LC50	300 mg/l	Fish	96 h	Lepomis macrochirus	OECD Guideline 203 (Fish, Acute Toxicity Test)
Sodium carbonate 497-19-8	EC50	200 - 227 mg/l	Daphnia	48 h	Ceriodaphnia sp.	OECD Guideline 202 (Daphnia sp. Acute Immobilisation Test)
Sodium carbonate 497-19-8	EC50	137 mg/l	Algae	5 d	Nitzschia sp.	OECD Guideline 201 (Alga, Growth Inhibition Test)
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	NOEC	> 0,43 - 0,89 mg/l	Fish	28 d	Salmo gairdneri (new name: Oncorhynchus mykiss)	OECD 210 (fish early lite stage toxicity test)
	LC50 NOEC	1,67 mg/l 1 mg/l	Fish Fish	96 h 28 d	Lepomis macrochirus Lepomis macrochirus	OECD Guideline 204 (Fish, Prolonged Toxicity Test: 14-day Study)
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	EC50	2,9 mg/l	Daphnia	48 h	Daphnia magna	OECD Guideline 202 (Daphnia sp. Acute Immobilisation Test)
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	NOEC	2,4 mg/l	Algae	72 h	Scenedesmus subspicatus (new name: Desmodesmus subspicatus)	DIN 38412-15
	EC50	127,9 mg/l	Algae	72 h	Scenedesmus subspicatus (new name: Desmodesmus subspicatus)	
Alcohols, C12-18, ethoxylated 68213-23-0	LC50	1,2 mg/l	Fish	48 h	Leuciscus idus	DIN 38412-15
	NOEC	0,32 mg/l	Fish	28 d	Oncorhynchus mykiss	OECD Guideline 204 (Fish, Prolonged Toxicity Test: 14-day Study)
Alcohols, C12-18, ethoxylated 68213-23-0	EC50	3 mg/l	Daphnia	24 h	Daphnia magna	
Alcohols, C12-18, ethoxylated 68213-23-0	EC50	3,1 mg/l	Algae	72 h	Scenedesmus subspicatus (new name: Desmodesmus subspicatus)	DIN 38412-09
Alcohols, C12-18, ethoxylated 68213-23-0	NOEC	0,24 mg/l	chronic Daphnia			OECD 211 (Daphnia magna, Reproduction Test)

12.2. Persistence and degradability**Persistence and degradability:****Degradation of surfactants**

The biodegradability of the surfactants contained in the product is in accordance with the requirements of the EU Detergent Regulation (EC/648/2004).

The surfactants contained in the products are primary biodegradable to at least 90% on average.

Hazardous components CAS-No.	Result	Route of application	Degradability	Method
---------------------------------	--------	-------------------------	---------------	--------

Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	readily biodegradable	aerobic	85 %	OECD Guideline 301 B (Ready Biodegradability: CO2 Evolution Test)
Alcohols, C12-18, ethoxylated 68213-23-0	readily biodegradable	aerobic	79 %	OECD Guideline 301 D (Ready Biodegradability: Closed Bottle Test)

12.3. Bioaccumulative potential / 12.4. Mobility in soil

Hazardous components CAS-No.	LogKow	Bioconcentration factor (BCF)	Exposure time	Species	Temperature	Method
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	3,32					

12.5. Results of PBT and vPvB assessment

Hazardous components CAS-No.	PBT/vPvB
Benzenesulfonic acid, C10-13-alkyl derivs., sodium salts 68411-30-3	Not fulfilling Persistent, Bioaccumulative and Toxic (PBT), very Persistent and very Bioaccumulative (vPvB) criteria.
Alcohols, C12-18, ethoxylated 68213-23-0	Not fulfilling Persistent, Bioaccumulative and Toxic (PBT), very Persistent and very Bioaccumulative (vPvB) criteria.

12.6. Other adverse effects

No data available.

SECTION 13: Disposal considerations**13.1. Waste treatment methods**

Product disposal:

In consultation with the responsible local authority, must be subjected to special treatment.

Waste code

070601

The valid EWC waste code numbers are source-related. The manufacturer is therefore unable to specify EWC waste codes for the articles or products used in the various sectors. The EWC codes listed are intended as a recommendation for users. We will be happy to advise you.

SECTION 14: Transport information

- 14.1. UN number**
Not hazardous according to RID, ADR, ADN, IMDG, IATA-DGR.
- 14.2. UN proper shipping name**
Not hazardous according to RID, ADR, ADN, IMDG, IATA-DGR.
- 14.3. Transport hazard class(es)**
Not hazardous according to RID, ADR, ADN, IMDG, IATA-DGR.
- 14.4. Packaging group**
Not hazardous according to RID, ADR, ADN, IMDG, IATA-DGR.
- 14.5. Environmental hazards**
Not hazardous according to RID, ADR, ADN, IMDG, IATA-DGR.
- 14.6. Special precautions for user**
Not hazardous according to RID, ADR, ADN, IMDG, IATA-DGR.
- 14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code**
not applicable

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

VOC content 0 %
(1999/13/EC)

15.2. Chemical safety assessment

A chemical safety assessment has not been carried out.

National regulations/information (Germany):

WGK: WGK = 2, water endangering product. Classification according to the mixture rules in German VwVwS regulation annex 4 from 27.July 2005.

Storage class according to TRGS 510: 10

SECTION 16: Other information

The labelling of the product is indicated in Section 2. The full text of all abbreviations indicated by codes in this safety data sheet are as follows:

- H302 Harmful if swallowed.
- H315 Causes skin irritation.
- H318 Causes serious eye damage.
- H319 Causes serious eye irritation.
- H335 May cause respiratory irritation.
- H412 Harmful to aquatic life with long lasting effects.

Further information:

This information is based on our current level of knowledge and relates to the product in the state in which it is delivered. It is intended to describe our products from the point of view of safety requirements and is not intended to guarantee any particular properties.

Label elements (DPD):

Xi - Irritant



Risk phrases:

R41 Risk of serious damage to eyes.

Safety phrases:

- S22 Do not breathe dust.
- S26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.
- S39 Wear eye/face protection.

Relevant changes in this safety data sheet are indicated by vertical lines at the left margin in the body of this document. Corresponding text is displayed in a different color on shadowed fields.